

APPENDIX E

LONG TERM STEWARDSHIP

This appendix describes the national and Savannah River Site (SRS) perspectives on long-term stewardship.

National Perspective on Long Term Stewardship

Long Term Stewardship Report to Congress

In January 2001, the Department of Energy (DOE) published *A Report to Congress on Long-Term Stewardship*, containing the most comprehensive analysis to date of the DOE's existing and anticipated long-term stewardship obligations at DOE sites. The request for this report in the Fiscal Year (FY) 2000 National Defense Authorization Act (NDAA) reflects a continuing Congressional interest in long-term stewardship costs and management and demonstration of the degree of success achieved by nearly \$60 billion of environmental management funding.

The report identifies the long-term stewardship activities anticipated by DOE at as many as 129 sites by the year 2006. DOE already performs long-term stewardship activities at 34 sites that have been cleaned up and closed. While the primary focus of the report is on the anticipated scope, schedule, and cost for long-term stewardship activities from 2001 through the year 2006, the report also provides a preliminary glimpse of what DOE's long-term stewardship obligations may be post 2006.

There have been many interpretations of the term "long-term stewardship." Therefore, in the report, DOE defined long-term stewardship as follows:

...all activities necessary to ensure protection of human health and the environment following completion of

cleanup, disposal, or stabilization at a site or a portion of a site. Long-term stewardship includes all engineered and institutional controls designed to contain or to prevent exposure to residual contamination and waste, such as surveillance activities, record-keeping activities, inspections, groundwater monitoring, ongoing pump and treat activities, cap repair, maintenance of entombed buildings or facilities, maintenance of other barriers and containment structures, access control, and posting signs. ("Developing the Report to Congress on Long-Term Stewardship", June 2001.)

DOE's *Report to Congress on Long-Term Stewardship* reemphasizes DOE's commitment to long-term stewardship. The report recognizes:

- DOE has been and intends to continue performing cleanup to standards that do not allow for unrestrictive land use;
- Even if unrestricted land use were to be sought, it is often technically and economically infeasible;
- Consequently, long-term stewardship will be required for many years into the future; and
- Given the need for long-term stewardship to ensure the continued effectiveness of cleanup work, DOE intends to establish reliable management plans to carry out the long-term stewardship mission.

This report also emphasizes the role and responsibility of the DOE landlord function with respect to long-term stewardship activities. The policy directs the landlord program Secretarial Officers to be responsible for conducting the long-term stewardship program at their sites, unless other arrangements are made. The policy objective is to initiate actions that will lead

facility managers to plan, budget, and transition long-term stewardship activities in a timely manner.

Office of Legacy Management

In FY 2004 DOE requested and Congress approved a change in the management of long-term stewardship responsibility for DOE closure sites by creating the Office of Legacy Management (OLM) within DOE. The mission of the OLM is to manage the Department's post-closure responsibilities and ensure the future protection of human health and the environment. The OLM has control and custody for legacy land, structures and facilities and is responsible for maintaining them. As currently defined by Congress, this applies to closure sites. The January 2001 *Long-term Stewardship Congressional Report* assigns long-term stewardship to site landlords for non-closure sites.

Environmental Management (EM) Completion

As part of DOE's continuing efforts to accelerate cleanup and follow-up actions from the *EM Top-to-Bottom Review*, a special EM-1 focus team developed and issued a definition of completion. (Definition of Environmental Management Completion Memo, Jessie Roberson to EM Field Office Managers, February 12, 2003.) SRS validated that these definitions were incorporated in the contractor's baseline.

Institutional Controls

In April 2003 DOE issued its *Use of Institutional Controls Policy* (DOE P 454.1). This policy delineates how the Department, including the National Nuclear Security Administration, will use institutional controls in the management of resources, facilities, and properties under its control and to implement its programmatic responsibilities.

This policy is particularly significant to SRS regulators because it re-emphasizes DOE's commitment to perpetually maintaining institutional controls and seeks sufficient funds to do so. The policy states, "DOE will maintain the institutional controls as long as necessary to perform their intended protective purposes and seek sufficient funds." (DOE Policy P 454.1, *Use of Institutional Controls*, April 9, 2003.)

DOE uses a wide range of institutional controls as part of efforts to:

- appropriately limit access to, or uses of, land, facilities, and other real and personal properties;
- protect the environment (including cultural and natural resources);
- maintain the physical safety and security of DOE facilities; and
- prevent or limit inadvertent human and environmental exposure to residual contaminants and other hazards.

The policy states:

In situations where unrestricted use or unrestricted release of property is not desirable, practical, or possible, institutional controls are necessary and important to DOE efforts to fulfill its programmatic responsibilities to protect human health and the environment (including natural and cultural resources). It is DOE policy to use institutional controls as essential components of a defense-in-depth strategy that uses multiple, relatively independent layers of safety to protect human health and the environment (including natural and cultural resources). This strategy uses a graded approach to attain a level of protection appropriate to the risks involved. DOE will use a graded approach to determine what types and levels of protective measures (e.g., physical, administrative, etc.) should be used.

SRS Perspectives on Long-Term Stewardship

The SRS cleanup program has already accomplished significant risk reduction, but the “to-go” cleanup program to complete the task is also significant. As a result of DOE-WSRC contract modifications in 2003, 1013 EM facilities were identified as candidates for decommissioning. Of these 144 are considered nuclear facilities, 38 are considered radiological facilities, and 780 are considered industrial facilities. The 1013 facilities also include 51 high-level waste tanks, two of which are closed. To date, 142 facilities have been decommissioned. In addition to the facilities, there are 515 waste units identified, of which, over 300 have been classified as either remediated or as requiring no further action.

All EM decommissioning activities are being integrated with soils and groundwater regulatory closure activities. Contamination in the foundations of facilities will be removed to a level that does not create an additional waste unit. The plan is to implement Area Closure Records of Decision, which will include remediation and deactivation and decommissioning. These areas will be deleted

from the National Priority List of Superfund sites as activities are completed.

In August 1999, Department of Energy – Savannah River (DOE-SR), Environmental Protection Agency (EPA) and South Carolina Department of Health and Environmental Control (SCDHEC) signed a Memorandum of Agreement that establishes the *Land Use Control Assurance Plan* (LUCAP), which effectively establishes and implements procedures to assure the long-term effectiveness of Land Use Controls (LUCs) consistent with regulatory cleanup in the *Federal Facility Agreement* for SRS. For every Record of Decision (ROD) that requires land use controls, the LUCAP is updated with a ROD-specific LUC implementation plan that defines the institutional controls and long-term stewardship requirements. Annually, the DOE-SR Manager certifies that the Land Use Controls are being maintained.

The process of identifying all the detailed requirements for long-term stewardship activities anticipated for the site is ongoing. This appendix provides the general framework for the long-term stewardship process at SRS.

THIS PAGE INTENTIONALLY LEFT BLANK
